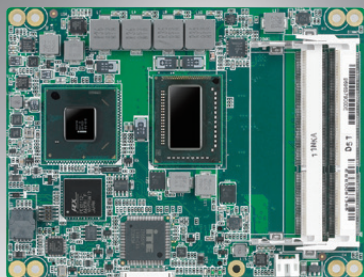


SOM-5790

Intel® Core™ i7/i5/i3 Processor
COM-Express Basic Module

NEW



iManager susiAccess CE FCC

Features

- Embedded Intel® Core™ i7/i5/i3 processor + QM67
- Intel Gfx supports 18/24-bit 2-CH LVDS, VGA
- Supports Dual Channel DDR3-1333 SODIMM sockets up to 16 GB
- Supports 5 PCIe1, 2 SATAIII, 2 SATAII, 8 USB 2.0, IDE, PCI
- Supports iManager, SUSIAccess and Embedded Software APIs

Software APIs:



Watchdog



I²C



SMBus



H/W Monitor



GPIO



Brightness

Utilities:



BIOS flash



Monitoring

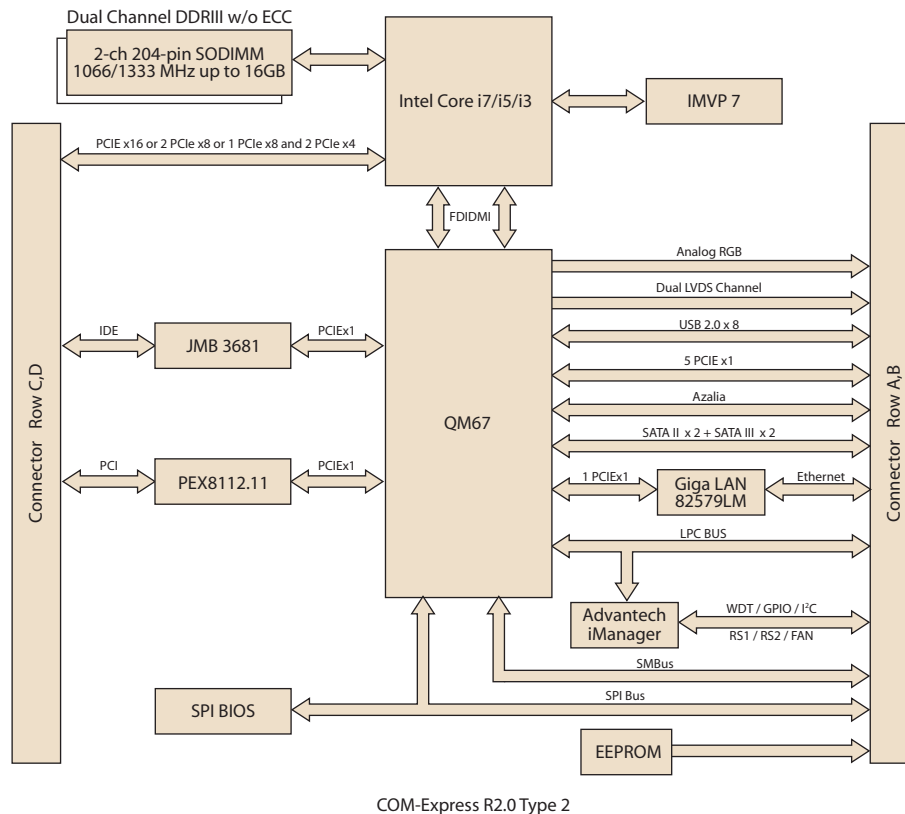


Embedded Security ID

Specifications

Form Factor		COM-Express 2.0 Basic Module, Type 2 Pin-out
Processor System	CPU	Intel Core i7-2715QE Processor (6 M Cache, 2.1 GHz) Intel Core i7-2655LE Processor (4 M Cache, 2.2 GHz) Intel Core i7-2610UE Processor (4 M Cache, 1.5 GHz) Intel Core i5-2515E Processor (3 M Cache, 2.5 GHz)
	System Chipset	Intel QM67
	BIOS	AMI 64 Mbit Flash BIOS
	Technology	DDR3 1066/1333 MHz
Memory	ECC Support	-
	Max. Capacity	16 GB
	Socket	2 x 204-pin SODIMM sockets
	Chipset	Intel GPU integrated in Core i7, Core i5, or Core i3
Display	LVDS	Single and dual channel 18/24-bit LVDS
	VGA	up to 2048 x 1536
	TV-out	-
	Chipset	Intel 82579LM Gigabit Ethernet
Ethernet	Speed	10/100/1000 Mbps
WatchDog Timer		65536 level timer interval, from 0-65535 sec, multi-level, multi-option watchdog timer
Expansion		1 PEGx16, 5 PCIe1, PCI, LPC, SPI, SMBus, I2C
I/O	PATA	1 x EIDE (UDMA 100)
	SATA	2 x SATAIII (6.0 Gb/s), 2 x SATAII (3.0 Gb/s)
	USB	8 x USB 2.0
	Audio	High definition audio interface
	GPIO	8-bit GPIO
	Serial Port	2 x UARTs up to 115.2K bps
Power	Power Type	ATX, AT
	Power Supply Voltage	+12 V and +5 VSB for ATX, +12V for AT
Environment	Operating Temperature	0 ~ 60° C (32 ~ 140° F)
	Operating Humidity	0% ~ 90% relative humidity, non-condensing
Mechanical	Dimensions	125 x 95 mm (4.92" x 3.74")

Block Diagram



COM-Express R2.0 Type 2

Ordering Information

Part No.	CPU	LLC	Chipset	PCI	IDE	DDR3 SODIMM	LVDS	VGA	SDVO	Giga LAN	HDA	PEG x16	PCIe x1	USB 2.0	SATA	LPC	ATX Power	AT Power	Thermal Solution	Operating Temp.
SOM-5790FG-U1A1E	Core i7-2715QE 2.1 GHz	6 MB	QM67	4	1	non-ECC	18/24-bit	Yes	1	1	Yes	1	5	8	2 x SATA III 2 x SATA II	Yes	Yes	Yes	Active	0 ~ 60° C
SOM-5790FG-U2A1E	Core i7-2655LE 2.2 GHz	4 MB	QM67	4	1	non-ECC	18/24-bit	Yes	1	1	Yes	1	5	8	2 x SATA III 2 x SATA II	Yes	Yes	Yes	Active	0 ~ 60° C
SOM-5790FG-S5A1E	Core i7-2610UE 1.5 GHz	4 MB	QM67	4	1	non-ECC	18/24-bit	Yes	1	1	Yes	1	5	8	2 x SATA III 2 x SATA II	Yes	Yes	Yes	Active	0 ~ 60° C
SOM-5790FG-U5A1E	Core i5-2515E 2.5 GHz	3 MB	QM67	4	1	non-ECC	18/24-bit	Yes	1	1	Yes	1	5	8	2 x SATA III 2 x SATA II	Yes	Yes	Yes	Active	0 ~ 60° C
SOM-5790FG-S4A1E	Celeron B827E 1.4 GHz	1.5 MB	QM67	4	1	non-ECC	18/24-bit	Yes	1	1	Yes	1	5	8	2 x SATA III 2 x SATA II	Yes	Yes	Yes	Active	0 ~ 60° C

Note: Passive = fanless; Active = with fan

Development Board

Part No.	Description
SOM-DB5700G-00A2E	Development board for SOM-Express GLAN Rev.A2

Optional Accessories

Part No.	Description
1960048820N001	Cooler I-Arrandale M-41W 125X95X33-SC 12V0.45A

Packing List

Part No.	Description	Quantity
	SOM-5790 CPU Module	1
1960052353N001	Heatspreader for CPU Core i7/i5/i3 series	1
1960052353N011	Heatspreader for CPU Celeron series	1